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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/919,814	08/02/2001	Yukihiko Ichikawa	018775-836	4284

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EXAMINER

MILIA, MARK R

ART UNIT	PAPER NUMBER
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2622

DATE MAILED: 08/11/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/919,814

Applicant(s)

ICHIKAWA ET AL.

Examiner

Mark R. Milia

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 23 May 2005.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-15 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-15 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 5/23/05 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____.

DETAILED ACTION

Response to Amendment

1. Applicant's amendment was received on 5/23/05, and has been entered and made of record. Currently, claims 1-15 are pending.

Drawings

2. Applicant's amendment to Fig. 12 to re-label reference character "20" as "520" has overcome the objection to the Drawings as cited in the previous Office Action. Therefore the objection has been withdrawn.

Specification

3. Applicant's amendment to the specification to correct editorial errors has overcome the objection to the specification as cited in the previous Office Action. Therefore the objection has been withdrawn.

Claim Rejections - 35 USC § 101

4. Applicant's amendment to claims 8 and 15 to address non-statutory subject matter has overcome the rejection to the claims as cited in the previous Office Action. Therefore the rejection has been withdrawn.

Response to Arguments

5. Applicant's arguments filed 5/23/05 have been fully considered but they are not persuasive.

In response to applicant's arguments regarding the rejection of claims 1-15, more specifically claim 1, wherein on pages 9-14, the applicants asserts that the reference of Miyaza does not disclose selection of font data from among a plurality of font data of different sizes based on the recognized character code and outputting the selected font data. The Examiner respectfully disagrees with the applicant as the reference of Miyaza does disclose such features. Particularly, Miyaza states the storing and referencing of font data as part of embodiment 36. Miyaza discloses the storage of font data of various sizes that are used to aid in the recognition of characters and the replacement of unreadable characters (see column 59 lines 40-44, column 60 lines 16-19 and 27-32, column 62 lines 10-12, and column 67 lines 63-65). Miyaza further discloses the outputting of the selected font data after the comparison has been made and the characters are replaced (see column 68 lines 4-11). Miyaza also discloses the

newly add limitation "to match with a region of the character image in the image data" because the system of Miyaza detects a character and compares this character with a number of different fonts to find the font that corresponds to the character, magnifies or reduces the characters to ensure readability and outputs the data, by copying means, which is matching all the characters to ensure that they are all the same font and size to produce the correct image data (see column 59 line 33-column 60 line 39 and column 67 line 31-column 68 line 67).

6. Therefore, the rejection of claims 1-15, as cited in the previous Office Action dated 2/22/05, is maintained and repeated in this Office Action.

Claim Rejections - 35 USC § 102

7. The text of those sections of Title 35 U.S. Code not included in this Office Action can be found in a prior Office Action.

8. Claims 1-3 and 5-8 are rejected under 35 U.S.C. 102(b) as being anticipated by U.S. Patent No. 5825942 to Miyaza.

Regarding claim 1, Miyaza discloses an image processor comprising a code recognizer which recognizes character code from a character image included in image data to be processed (see column 10 lines 42-48, column 11 lines 10-20, column 12 lines 46-53, and column 13 lines 21-35), a size recognizer which recognizes character sizes of the character image (see column 10 lines 3-7 and column 12 lines 13-20 and 51-54), a setter which sets a magnification (see column 8 lines 59-65, column 9 lines 5-

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8, and column 12 lines 39-45), a magnification changer which enlarges or reduces the image data according to the magnification set said setter (see column 10 lines 42-48, column 11 lines 5-9, column 21 lines 16-31, and column 43 lines 7-27), a memory section which stores a plurality of font data of different sizes (see column 13 lines 38-51 and column 67 lines 63-65), a selector which selects a font data from among the plurality of data stored in said memory section, based on the character code recognized by said code recognizer, the font size recognized by said size recognizer and the magnification set by said setter, to match with a region of the character image in the image data (see column 13 lines 38-51, column 59 lines 40-44, column 60 lines 16-19 and 27-32, column 62 lines 10-12, and column 67 lines 63-65, column 67 lines 36-46, and column 67 line 59-column 68 line 18), and an output section which outputs the font data selected said selector (see Fig. 3, column 8 lines 46-57, column 64 lines 1-4, and column 68 lines 4-11 and 40-42).

Regarding claims 7 and 8, Miyaza discloses an image processing method and computer readable medium storing a program comprising the steps of recognizing character code from a character image included in an image data to be processed (see column 10 lines 42-48, column 11 lines 10-20, column 12 lines 46-53, and column 13 lines 21-35), recognizing character size of the character image (see column 10 lines 3-7 and column 12 lines 13-20 and 51-54), setting a magnification (see column 8 lines 59-65, column 9 lines 5-8, column 10 lines 42-48, column 11 lines 5-9, column 12 lines 39-45, column 21 lines 16-31, and column 43 lines 7-27), selecting font data from among a plurality of font data of different sizes, based on the recognized character code, the

recognized font sizes and the set magnification to match with a region of the character image in the image data (see column 13 lines 38-51, column 59 lines 40-44, column 60 lines 16-19 and 27-32, column 62 lines 10-12, and column 67 lines 63-65, column 67 lines 36-46, and column 67 line 59-column 68 line 18), and outputting the selected font data (see Fig. 3, column 8 lines 46-57, column 64 lines 1-4, and column 68 lines 4-11 and 40-42).

Regarding claim 2, Miyaza discloses the system discussed in claim 1, and further discloses a reading section which reads a document image to provide the image data to be processed (see column 7 lines 49-50).

Regarding claim 3, Miyaza discloses the system discussed in claim 1, and further discloses an image-forming section which forms an image on a recording medium based on the font data outputted by said output section (see Fig. 3, column 8 lines 46-57, and column 64 lines 1-4).

Regarding claim 5, Miyaza discloses the system discussed in claim 1, and further discloses a size changer which changes the font size selected by said selector, based on the character size recognized by said size recognizer and the magnification set by said setter (see column 67 lines 36-46 and column 65 lines 14-62).

Regarding claim 6, Miyaza discloses the system discussed in claim 1, and further discloses wherein said magnification changer enlarges or reduces the character image based on the magnification set by said setter when font data in correspondence to the character code recognized by said code recognizer is not stored in said memory section (see column 21 lines 16-31 and column 43 lines 7-27).

Claim Rejections - 35 USC § 103

9. Claims 9-15 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent No. 6243549 to Ando in view of Miyaza.

Regarding claim 9, Ando discloses an instruction section which instructs to output image data of N pages to be processed in M sheets of recording medium, wherein N and M are natural numbers and N is not equal to M (see Figs. 6B, 6D, and 7A, column 5 lines 12-14, column 6 lines 52-58, column 6 line 66-column 7 line 37, column 8 lines 48-52, and column 12 lines 15-46), a synthesizer which generates output image data by laying out the font data selected by said selector in the M sheets (see column 4 lines 40-42, column 5 lines 12-14, and column 12 lines 15-46), and an output section which outputs the output image data generated by said synthesizer (see column 3 lines 47-55).

Ando does not disclose expressly a code recognizer which recognizes character code from a character image included in the image data of N pages, a memory section which stores a plurality of font data, and a selector which selects font data from among the plurality of font data stored in said memory section, based on the character code recognized by said code recognizer, the font data recognized by said size recognizer and the magnification set by said setter, to match with a region of the character image in the image data.

Miyaza discloses a code recognizer which recognizes character code from a character image included in the image data of N pages (see column 10 lines 42-48, column 11 lines 10-20, column 12 lines 46-53, and column 13 lines 21-35), a memory section which stores a plurality of font data (see column 13 lines 38-51 and column 67 lines 63-65), and a selector which selects font data from among the plurality of font data stored in said memory section, based on the character code recognized by said code recognizer, the font data recognized by said size recognizer and the magnification set by said setter, to match with a region of the character image in the image data (see column 13 lines 38-51, column 59 lines 40-44, column 60 lines 16-19 and 27-32, column 62 lines 10-12, and column 67 lines 63-65, column 67 lines 36-46, and column 67 line 59-column 68 line 18).

Regarding claims 14 and 15, Ando discloses instructing to output image data of N pages to be processed in M sheets of recording medium, wherein N and M are natural numbers and N is not equal to M (see Figs. 6B, 6D, and 7A, column 5 lines 12-14, column 6 lines 52-58, column 6 line 66-column 7 line 37, column 8 lines 48-52, and column 12 lines 15-46), generating an output image data in a layout of M sheets by using the selected font data (see column 3 lines 47-55, column 4 lines 40-42, column 5 lines 12-14, column 6 line 66-column 7 line 37, and column 12 lines 15-46), and outputting the generated output image data (see column 3 lines 47-55).

Ando does not disclose expressly recognizing character code from a character image included in the image data of N pages and selecting font data from among a plurality of font data, based on the recognized character code.

Miyaza discloses recognizing character code from a character image included in the image data of N pages (see column 10 lines 42-48, column 11 lines 10-20, column 12 lines 46-53, and column 13 lines 21-35) and selecting font data from among a plurality of font data, based on the recognized character code (see column 13 lines 38-51, column 67 lines 36-46, and column 67 line 59-column 68 line 18).

Ando & Miyaza are combinable because they are from the same field of endeavor, manipulation of documents using an image forming apparatus.

At the time of the invention, it would have been obvious to a person of ordinary skill in the art to combine the character recognizer, magnifier, and correction system of Miyaza with the system of Ando.

The suggestion/motivation for doing so would have been to provide a system in which only those documents which are in a readable condition will be printed (see column 13 lines 9-15 of Miyaza).

Therefore, it would have been obvious to combine Miyaza with Ando to obtain the invention as specified in claims 9 and 14-15.

Regarding claim 10, Ando and Miyaza discloses the system discussed in claim 9, and Miyaza further discloses wherein said memory section stores the plurality of font data of different sizes, further comprising a font size calculator which calculates a size of the font data to be selected by said selector so that the font data selected by said selector are included in a predetermined are in the M sheets (see column 65 lines 14-62 and column 67 lines 36-46).

Regarding claim 11, Ando and Miyaza discloses the system discussed in claim 9, and Ando further discloses a region size calculator which calculates a size of an output character region in the M sheets according to the character region (see column 6 line 66-column 7 line 37 and column 8 line 17-column 10 line 14) and Miyaza further discloses a discriminator which discriminates a character region in the image data to be processed (see column 12 lines 47-54) and a font size calculator which calculates a size of the font data to be selected by said selector so that the font data selected by said selector are included in the output character region in the M sheets (see column 65 lines 14-62 and column 67 lines 36-46).

Regarding claim 12, Ando and Miyaza discloses the system discussed in claim 9, and Ando further discloses wherein N is larger than M (see column 5 lines 12-14, column 8 lines 48-52, and column 12 lines 15-46).

Regarding claim 13, Ando and Miyaza discloses the system discussed in claim 12, and Ando further discloses wherein N is an odd number (see column 6 lines 52-58, reference teaches that N can be any number of pages therefore N can be an odd number and is analogous to the claim).

Ando & Miyaza are combinable because they are from the same field of endeavor, manipulation of documents using an image forming apparatus.

At the time of the invention, it would have been obvious to a person of ordinary skill in the art to combine the character recognizer, magnifier, and correction system of Miyaza with the system of Ando.

The suggestion/motivation for doing so would have been to provide a system in which only those documents which are in a readable condition will be printed (see column 13 lines 9-15 of Miyaza).

Therefore, it would have been obvious to combine Miyaza with Ando to obtain the invention as specified in claims 10-13.

Claim 4 is rejected under 35 U.S.C. 103(a) as being unpatentable over Miyaza as applied to claim 1 above, and further in view of U.S. Patent No. 5533174 to Flowers Jr. et al.

Miyaza does not disclose expressly a communication section which communicates with an external apparatus, wherein said selector selects the compatible font data from among a plurality of font data stored in the external apparatus via the communication section.

Flowers discloses a communication section which communicates with an external apparatus, wherein said selector selects the compatible font data from among a plurality of font data stored in the external apparatus via the communication section (see Figs. 1 and 2, column 4 lines 9-13 and 22-36, column 5 lines 6-16, and column 12 lines 3-21).

Miyaza & Flowers are combinable because they are from the same field of endeavor, matching character fonts for subsequent printing.

At the time of the invention, it would have been obvious to a person of ordinary skill in the art to combine the external font server of Flowers with the system of Miyaza.

The suggestion/motivation for doing so would have been eliminate the need for the client to devote storage space to character fonts and to increase processing time (see column 4 lines 22-27 and column 13 lines 5-8 of Flowers).

Therefore, it would have been obvious to combine Flowers with Miyaza to obtain the invention as specified in claim 4.

Conclusion

10. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.


Any inquiry concerning this communication or earlier communications from the examiner should be directed to Mark R. Milia whose telephone number is (571) 272-7408. The examiner can normally be reached M-F 8:00am-4:00pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Edward Coles can be reached at (571) 272-7402. The fax number for the organization where this application or proceeding is assigned is 571-272-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Mark R. Milia
Examiner
Art Unit 2622

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